



Appl. No. 10/712,153
Amdt. dated 03/28/2006
Reply to Office action of 09/28/2005

P804-1242D-US

Amendments to the Specification:

1. Please replace paragraph [0002] with the following amended paragraph:

[0002] This application is a continuation-in-part of U.S. Application Ser. No. 10/364,945, filed February 12, 2003; which is a continuation-in-part of Application Ser. No. 10/004,956, filed December 5, 2001 and issued as U.S. Patent Number 6,722,440; which claims the benefit of U.S. Provisional Application Ser. No. 60/251,293, filed December 5, 2000. U.S. Patent Application Ser. No. 10/364,945 is also a continuation-in-part of U.S. Patent Application Ser. No. 09/378,384, filed August 20, 1999 and issued as Patent No. 6,397,949, which claims the benefit of U.S. Provisional Application Ser. No. 60/097,449, filed August 21, 1998.

2. Please replace paragraph [0068] with the following amended paragraph:

[0068] Referring now more particularly to PACV assembly 108, there is shown outer sleeve upper portion 118 joined with an outer sleeve lower portion 116 by threaded connection 128. ~~For the purpose of clarity in the drawings, these openings have been shown at a 45° inclination.~~ Outer sleeve upper portion 118 includes a plurality of production openings 160 for the flow of fluid from the formation when the valve is in an open configuration. For the purpose of clarity in the drawings, these openings have been shown at a 45° inclination. Outer sleeve upper portion 118 also includes through bores 148 and 150. Disposed within bore 150 is shear pin 151, described further below. The outer sleeve assembly has an outer surface and an internal surface. On the internal surface, the outer sleeve upper portion 118 defines a shoulder 188 (see Figure 6C) and an area of reduced wall thickness extending to threaded connection 128 resulting in an increased internal diameter between shoulder 188 and connection 128. Outer sleeve lower

portion 116 further defines internal shoulder 189 and an area of reduced internal wall thickness extending between shoulder 189 and threaded connection 122. Adjacent threaded connection 138, outer sleeve portion 118 defines an annular groove 176 adapted to receive a locking ring 168.

3. Please replace paragraph [0090] with the following amended paragraph:

[0090] From the configuration shown in Figures 13A - 13E, the ball holding service tool 800 is pulled further uphole to the position shown in Figures 14A - 14E. In particular, the ball holding service tool 800 is brought to a position wherein the collet 831 is just above a shoulder 835 of the crossover tool and packer. As the ball holding service tool 800 is again run into the crossover tool and packer, the collet 831 remains stationery against the shoulder 835 so that the push ring 833 remains stationary relative to the downwardly moving holding barrel 826. As shown in Figure 14C, this relative movement moves the lock dogs 812 out from under the push ring 833. The lock dogs 812 are biased in an uphole direction by a spring 836 such that upon being released by the push ring 833, the lock dogs 812 pop out of the groove in the holding ~~mandrel~~ barrel 826.

4. Please replace paragraph [00151] with the following amended paragraph:

[00151] ~~The invention includes in one embodiment an~~ An isolation string is disclosed having an upper packer and an isolation pipe in mechanical communication with the upper packer, the isolation pipe ~~comprising~~ comprises an operable valve and an object activated valve. An object holding service tool is adapted and the isolation string coupled to an object holding service

~~tool adapted~~ to release an object to ~~engage~~ activate the object activated valve. Also disclosed
~~The present invention also includes in one embodiment~~ a method of running-in an isolation
string, comprising an operable valve and an object activated valve, with an object holding service
tool having an object held therewith ~~into the well, the isolation string comprising an operable~~
~~valve and an object activated valve~~; setting the isolation string in the casing adjacent
perforations; pressurizing the object to cause a release from the object holding service tool,
whereby the object travels to the object activated valve; closing the object activated valve with
the released object; and withdrawing the object holding service tool from the well.